

Montana Department of Natural Resources and Conservation
Water Resources Division
Water Rights Bureau

ENVIRONMENTAL ASSESSMENT
For Routine Actions with Limited Environmental Impact

Part I. Proposed Action Description

1. Applicant/Contact name and address: **Joie E. Kramer
226 Autumn Ln
Deer Lodge MT 59722-8746**
2. Type of action: **Application to Change a Water Right No. 30027074-76G
Statements of Claim Nos. 9642, 9643, 9644, 9645, 9646-76G**
3. Water source name: **Dempsey Creek**
4. Location affected by action: **SWNWNW, Sec 6, Twp 6N, Rge 9W, Powell County**
5. Narrative summary of the proposed project, purpose, action to be taken, and objectives:
The applicant proposes to add a place of storage to five historic water rights. The new place of storage would be located in the SWNWNW of Sec 6, Twp 6N, Rge 9W, Powell County. The pond would be used to supplement irrigation of a 110 acre center pivot on historically irrigated acres. 33.3 acres will continue to be flood irrigated for a total of 143.3 maximum acres.

The proposed pond is approximately .37 acres in size with an approximate volume of 1.7 acre-feet. Evaporation is assumed to be approximately 1.1 acre-feet per season. The pond will be filled during the normal irrigation season for these rights. The overflow from the proposed pond would be used for further irrigation.

The amount of water that will be diverted would not be increased from the historical uses and would not exceed the amount allotted in the historic water rights. Water diverted from Dempsey Creek is distributed by a water commissioner. No additional water will be diverted by this change. The flow rate required to run the pivot is 780 gpm which will be supplemented by the pond storage. The water commissioner records show the volume of water diverted in 2006 was 6148.24 acre-inches or 512 acre-feet for the rights involved in this change.

The DNRC shall issue an Authorization to Change if the criteria in 85-2-402, MCA are met.

Agencies consulted during preparation of the Environmental Assessment:
(include agencies with overlapping jurisdiction)

DNRC – Eric Chase, Surface Water Hydrologist
MFIS – Montana Fisheries Information System
DEQ – Department of Environmental Quality - Montana 303(d) list
MTNHP - Montana Natural Heritage
NRCS Deer Lodge Field Office – Kevin Bossert, Soil Conservation Technician

Part II. Environmental Review

1. Environmental Impact Checklist:

PHYSICAL ENVIRONMENT

WATER QUANTITY, QUALITY AND DISTRIBUTION

Water quantity - Assess whether the source of supply is identified as a chronically or periodically dewatered stream by DFWP. Assess whether the proposed use will worsen the already dewatered condition.

Determination: **No significant adverse impact.**

According to the Department of Fish, Wildlife and Parks, Dempsey Creek is chronically dewatered from mile 0 to river mile 8.1. Chronic dewatering is a significant problem in virtually all years. The proposed project would not have any affect on the dewatered condition. No additional water will be diverted by this change.

Water quality - Assess whether the stream is listed as water quality impaired or threatened by DEQ, and whether the proposed project will affect water quality.

Determination: **No significant adverse impact.**

Dempsey Creek is on DEQ's water quality impaired list. The proposed project will not have any affect on water quality. No additional water will be diverted for this project.

Groundwater - Assess if the proposed project impacts ground water quality or supply. If this is a groundwater appropriation, assess if it could impact adjacent surface water flows.

Determination: **No significant adverse impact.**

The source of water for this proposed change authorization is Dempsey Creek, a surface water source.

DIVERSION WORKS - Assess whether the means of diversion, construction and operation of the appropriation works of the proposed project will impact any of the following: channel impacts, flow modifications, barriers, riparian areas, dams, well construction.

Determination: **No significant adverse impact.**

The proposed project will divert water from the existing headgate and convey it through an existing ditch. The proposed project will not impact well construction, dams, riparian areas, barriers, flow modifications, or channel impacts.

UNIQUE, ENDANGERED, FRAGILE OR LIMITED ENVIRONMENTAL RESOURCES

Endangered and threatened species - Assess whether the proposed project will impact any threatened or endangered fish, wildlife, plants or aquatic species or any "species of special concern," or create a barrier to the migration or movement of fish or wildlife. For groundwater, assess whether the proposed project, including impacts on adjacent surface flows, would impact any threatened or endangered species or "species of special concern."

Determination: **No significant adverse impact.**

According to information from the Montana Natural Heritage Program, the species of special concern in the area is the Salvelinus confluentus or the Bull Trout. This project would not impact any fish species. The point of diversion from Dempsey Creek is not part of the proposed project. No additional water is being diverted from Dempsey Creek.

Wetlands - Consult and assess whether the apparent wetland is a functional wetland (according to COE definitions), and whether the wetland resource would be impacted.

Determination: **No significant adverse impact.**

This proposed change does not involve a functional wetland.

Ponds - For ponds, consult and assess whether existing wildlife, waterfowl, or fisheries resources would be impacted.

Determination: **No significant adverse impact.**

The proposed new pond will have no impact on existing wildlife, waterfowl, or fisheries resources.

GEOLOGY/SOIL QUALITY, STABILITY AND MOISTURE - Assess whether there will be degradation of soil quality, alteration of soil stability, or moisture content. Assess whether the soils are heavy in salts that could cause saline seep.

Determination: **No significant adverse impact.**

Information concerning the geology and soil quality was not accessed. This is an historic irrigated area. The proposed project would not cause saline seep.

VEGETATION COVER, QUANTITY AND QUALITY/NOXIOUS WEEDS - Assess impacts to existing vegetative cover. Assess whether the proposed project would result in the establishment or spread of noxious weeds.

Determination: **No significant adverse impact.**
During the proposed pond construction the topsoil will be disturbed. The landowner is responsible for controlling any noxious weeds on the property.

AIR QUALITY - Assess whether there will be a deterioration of air quality or adverse effects on vegetation due to increased air pollutants.

Determination: **No significant adverse impact.**
During the proposed pond construction, there may be a deterioration of air quality. This should be a temporary change and not have a lasting impact on the air quality in the area.

HISTORICAL AND ARCHEOLOGICAL SITES - Assess whether there will be degradation of unique archeological or historical sites in the vicinity of the proposed project.

Determination: **No significant adverse impact.**
The proposed project involves land that has been previously disturbed and historically irrigated.

DEMANDS ON ENVIRONMENTAL RESOURCES OF LAND, WATER, AND ENERGY - Assess any other impacts on environmental resources of land, water and energy not already addressed.

Determination: **No additional impacts on environmental resources of land, water and energy were identified.**

HUMAN ENVIRONMENT

LOCALLY ADOPTED ENVIRONMENTAL PLANS AND GOALS - Assess whether the proposed project is inconsistent with any locally adopted environmental plans and goals.

Determination: **No significant adverse impact.**

ACCESS TO AND QUALITY OF RECREATIONAL AND WILDERNESS ACTIVITIES - Assess whether the proposed project will impact access to or the quality of recreational and wilderness activities.

Determination: **No significant adverse impact.**
The proposed project will not impact access to or the quality of recreational and wilderness activities.

HUMAN HEALTH - Assess whether the proposed project impacts on human health.

Determination: **No significant adverse impact.**

The proposed project will not impact human health.

PRIVATE PROPERTY - Assess whether there are any government regulatory impacts on private property rights.

Yes ☐ No ☒

OTHER HUMAN ENVIRONMENTAL ISSUES - For routine actions of limited environmental impact, the following may be addressed in a checklist fashion.

Impacts on:

- (a) Cultural uniqueness and diversity? **No significant adverse impact.**
- (b) Local and state tax base and tax revenues? **No significant adverse impact.**
- (c) Existing land uses? **No significant adverse impact. The land use is not changing.**
- (d) Quantity and distribution of employment? **No significant adverse impact.**
- (e) Distribution and density of population and housing? **No significant adverse impact.**
- (f) Demands for government services? **No significant adverse impact.**
- (g) Industrial and commercial activity? **No significant adverse impact.**
- (h) Utilities? **No significant adverse impact.**
- (i) Transportation? **No significant adverse impact.**
- (j) Safety? **No significant adverse impact.**
- (k) Other appropriate social and economic circumstances? **No significant adverse impact.**

2. Secondary and cumulative impacts on the physical environment and human population:

Secondary Impacts: **There have been no secondary impacts on the physical environment and human population identified at this time.**

Cumulative Impacts: **There have been no cumulative impacts on the physical environment and human population identified at this time.**

Describe any mitigation/stipulation measures: **The applicant discussed the proposed project with other Dempsey Creek water users in the area. The majority of them signed a statement stating they had no problem with the proposed project. No other mitigation or stipulation measures have been identified or discussed at this time.**

3. Description and analysis of reasonable alternatives to the proposed action, including the no action alternative, if an alternative is reasonably available and prudent to consider:

There do not appear to be any reasonable alternatives to the proposed action. The no action alternative would have the applicant use the water as it has been used historically.

PART III. Conclusion

1. Preferred Alternative: **Issue the authorization for the proposed project or in some form deemed reasonable.**
2. Comments and Responses: **No comments have been received at this time.**
3. Finding:
Yes ___ No **X** Based on the significance criteria evaluated in this EA, is an EIS required?

If an EIS is not required, explain why the EA is the appropriate level of analysis for this proposed action:

An environmental assessment is the appropriate level of analysis for this proposed action because no significant environmental impacts were identified.

Name of person(s) responsible for preparation of EA:

Name: Kathy Arndt
Title: Water Resource Specialist
Date: April 4, 2007